

Claims

1. A water jet device for severing a biological structure comprising a storage container (1) with a severing liquid; a piston cylinder unit (2) having an eccentric drive means (20); and an operating hand piece (3), wherein said piston cylinder unit (2) is connected to said storage container (1) via a suction line (4) and to said operating hand piece (3) via a pressure line (7), characterized in that said piston cylinder unit (2) is separably connected to said eccentric drive means (20), and said piston cylinder unit (2) is formed with said suction line (4), said pressure line (7) and said operating hand piece (3) as an application specific set.

2. A water jet device according to claim 1, characterized in that the connection of said piston cylinder unit (2) and said eccentric drive means (20) is provided by a plug-in coupling.

3. A water jet device according to claim 1, wherein said piston cylinder unit (2) comprises a cylinder casing (16) and a piston (17) fitted into said cylinder casing (16) and connected to said eccentric drive means (20) which both form a suction and pressure space (24), wherein said suction and pressure space (24) has a suction intake with a check valve (28) and a pressure intake (29), and which is sealed to the outside by means of a membrane (26), characterized in that said cylinder casing (16) and said piston (17) in addition to said suction and pressure space (24) form an annular parked position space (25) into which, on the one hand, the sealing element of said piston (17) dips and relaxes in the extended final position of said piston

(17) and, on the other hand, in which the membrane (26) has sufficient free space to move.

4. A water jet device according to claim 3,
characterized in that said parked position space (25) is formed in a tapered manner at least in the transition area toward said suction and pressure space (24), and said sealing element of said piston (17) is relaxed by the cone of said parked position space (5).

5. A water jet device according to claim 4,
characterized in that said cylinder casing (16) and said piston of said piston cylinder unit (2) is made of plastic, and said sealing element of said piston is designed as a sealing lip (23) projecting and machined on to said piston(17).

6. A water jet device according to claim 3,
characterized in that said pressure intake (29) of said suction and pressure space (24) is designed as a compression connection, wherein a pressure tubule (30) having projecting press ribs and a press sleeve (31) each are pressed into said cylinder casing (16), and said press sleeve (31) surrounds said press ribs of said pressure tubule (30) in such a distance which corresponds to the material thickness of said pressure line (7).

7. A water jet device according to claim 6,
characterized in that said suction intake and said pressure intake (29) are arranged radially toward said cylinder casing (16) and opposite to each other such that said pressure tubule (30) can be mounted from inside through said suction intake and said suction and pressure space (16).